

India's maiden Mars orbiter Mangalyaan successfully enters red planet's orbit

IBN Live, Wednesday, 24th September 2014

In its maiden attempt, India on Wednesday successfully placed Mars Orbiter Mission or Mangalyaan in the red planet's orbit. The Indian Space Research Organisation has created history and has entered the league of three other agencies which successfully launched Mars mission.

As all the operations were on schedule, India is the first Asian country to reach Mars in its first attempt. ISRO said, "All engines are going strong. Burning of fuel happening." All engines started burning as per the exact timeline.

Prime Minister Modi and Karnataka Chief Minister Siddaramaiah were at ISRO Telemetry Tracking and Command Network (ISTRAC) in Bangalore to witness the crucial Mars Orbiter Insertion.

Mangalyaan is primarily a technological mission and it has been configured to carry out observation of physical features of Mars and carry out limited study of the Martian atmosphere.

ISRO chairman Dr. K Radhakrishnan is personally leading the team of 14 top space scientists in this mission and worked on it for 15 months. More than 200 space scientists were in the control room monitoring even the minutest details of the Mars Mission's final phase.

ISRO will keep the Mars Spacecraft in the sight of Earth to control it well. The ISRO is doing a very complex maneuvering and the other three nations - USA, European Space Agency and Russia have failed in its first attempt.

Mars Spacecraft will send pictures back to the ISRO headquarters in Bangalore. ISRO is hoping to get the first pictures by this evening. Mars spacecraft can be as close as just 80 kms from the planet.

Mars Mission has been completely flawless since its launch on November 5, 2013. On Monday, it successfully test fired its main liquid engine which was in sleep mode for 10 months. The engine was test fired for precisely four seconds.

The Mars Spacecraft was lowered to enter into the Mars orbit. In the final action, the orbiter was slowed down from 22.1 km per second to 4.4 km per second in relation to the red planet to be captured by the Martian orbit.

ISRO has also uploaded commands to help the spacecraft automatically enter the orbit.

ISRO also has an advantage as it learnt from the previous missions of USA, ESA and Russia. There have been 11 attempts so far by all space agencies in the World. The success rate is just 40 per cent.

The Rs 450 crore mission is one of the cheapest one and as Modi said it cost less than Hollywood sci-fi film 'Gravity'.

The Mars Orbiter Mission, India's first interplanetary mission, was launched by India's workhorse Polar Satellite Launch Vehicle from the spaceport of Sriharikota in Andhra Pradesh.